BLACKGUM

Nyssa sylvatica Marsh.

plant symbol = NYSY

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Alternate Names
Black tupelo, blackgum, sour gum, pepperidge, tupelo, and tupelo-gum

Uses
Erosion Control: Reestablishes well in erosion prone areas like burned over forest, abandoned fields, rolling hills and cold mountain swamps.

Wildlife: Black bears, foxes, wood ducks, wild turkeys, robins, woodpeckers, mockingbirds, brown thrashers, thrushes, flickers, and starlings frequently eat the fruit, while white-tailed deer and beavers browse the twigs, foliage, and young sprouts. Additionally, provides cavity and nesting sites for a variety of birds and mammals and a good honey tree.

Timber: Its wood is used for light, non-splitting woodwork such as in docks and wharves; veneer, containers, crossties, and pallets.

Recreation and Beautification: Excellent ornamental plant for its straight bole, shapely crown and attractive autumn foliage.

Status
Please consult the PLANTS Web site and your State Department of Natural Resources for this plant's current status, such as, state noxious status and wetland indicator values.

Description
Nyssa sylvatica is a medium to large-sized native tree, frequently 60 to 80 ft tall and 3 to 4 ft in diameter. It typically has dense foliage with a conical crown on straight trunk. The simple, alternate leaves are leathery, and densely clustered at the branchlets. The small greenish white flowers are borne singly or in clusters. The bark is reddish brown and broken into deep irregular ridges and diamond-shaped plates.

Distribution: Blackgum grows from Maine west to New York, extreme southern Ontario, central Michigan, Illinois, central Missouri, and south to central Florida.

Adaptation
A wide variety of sites have adapted to the Blackgum. They range from the creek bottoms of the southern Coastal Plain to altitudes of 3,000 feet in North Carolina. It grows best on well-drained, light-textured soils on the low ridges of second bottoms and on the high flats of silt alluvium. Blackgum will tolerate brief spring flooding on alluvial sites and is common on the relatively dry upper and middle slopes in the Appalachian Mountains. On the drier uplands, it grows best on loam and clay loam. It is well adapted to fire. Older trees have thick bark and relatively high moisture content. Although aboveground portions of young trees are top-killed by fire, it typically survives by sprouting from the root crown or caudex.

Establishment
Blackgum is usually found in a mix of other species including black cherry (*Prunus serotina*), dogwood (*Cornus florida*), hickory (*Carya* spp.), oak (*Quercus* spp.), eastern hophornbeam (*Ostrya virginiana*), and yaupon (*Ilex vomitoria*), it is shade tolerant and seldom grows as the dominant tree but it usually grows in the intermediate crown class on most sites. It responds favorably to releases from overtopping vegetation. Seedlings grow slowly under a fully stocked stand. At the time of disturbance, large numbers of new seedlings can become established.

Smaller blackgum stumps sprout readily and larger stumps sprout and develop root suckers. Layering can be used to produce stocks.

Propagation from Seed: Seed production is highly variable, disseminated primarily by gravity and birds, others generally fall to the ground and remain dormant in the litter or are carried by water. Seeds overwinter on cool, damp soil and germinate the following spring. Blackgum requires nearly full sunlight for optimum early growth. Pre-chilled seeds must be sown in spring. Seeds are drilled at the rate of 15 ft per row and covered with ½ - 1 inch of soil. A mulch of sawdust is often used. Beds must be kept moist.

Propagation from Stumps: Blackgum sprouts from the stump following disturbance. Smaller sour gum stumps sprout readily while larger stumps sprout occasionally. Sprouts arise from suppressed buds and are concentrated near the top of the stump. Stump sprouts can produce seeds at 2 years of age.

Management
Seedling establishment is best accomplished by the shelterwood method. Regeneration can also be accomplished by clear-cutting if prior to a good seed fall or if advanced regeneration already exist. Due to the high palatability of seedlings and sprouts, controlling deer populations can protect Black tupelo. It often competes with loblolly and short-leaf pine for water and light, reducing its growth and development. Basal tree injections with herbicide is an effective control method for crown kill. Intermediate trees respond favorably to release from overhead vegetation; seedlings respond to reduction in canopy cover with relatively rapid height growth.

Cultivars, Improved and Selected Materials (and area of origin)
Materials are readily available from nurseries throughout its range.

Pests
Tupelo leaf minors (*Antispila nyssaefolia*) and forest tent caterpillar (*Malacosoma disstria*) attacks Black tupelo causing growth loss and occasional mortality.

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For more information about this and other plants, please contact your local NRCS field office or Conservation District, and visit the PLANTS Web site <http://plants.usda.gov>.